880726MK

KCEI

DUPLICATE

Before the

FEDERAL COMMUNICATIONS COMMISSION

Washington, D.C. 20554

In re Application of:	)	
	)	
Caprock Educational	)	File No. BPED-831220AD
Broadcasting Foundation	)	CP MOD. No. 880328M M
	)	
	)	
	)	
Amendment for	)	
Modification of	)	
Construction Permit	)	
New Non-Commercial Educational	)	
FM Station	)	
Call Sign KAMY-FM	)	
Lubbock, TX	)	

RECEIVED BY

JUL 26 1988

MAIL BRANCH

To: Chief, Mass Media Bureau

AMENDMENT TO

PETITION FOR RIGHT TO MODIFY CONSTRUCTION PERMIT

Comes now, Caprock Educational Broadcasting Foundation, and hereby request the Chief of the FM branch to accept the following amendment to the petition to modify the above mentioned construction permit.

On March 28, 1988 we applied for a modifcation of our existing construction permit.We would like to modify this application for modifcation to reflect minor changes in the original request, and a new tower site.

Wherefore, premises considered, and good cause having been shown, it is requested that this amendment to the petition for Modification of the above mentioned Construction Permit be accepted and made of the above referenced Construction Permit.

Respectfully submitted,

T. Kent Atkins
Trustee,

Caprock Educational
Broadcasting Foundation

CERTIFICATION

I hereby certify that all of the information is true, correct and complete to the best of my knowledge.

Dated, July 23, 1988

Signed 

United States of America
Federal Communications Commission
Washington, D.C. 20554

Approved by OMB
3060-0034
Expires 9/30/87

APPLICATION FOR CONSTRUCTION PERMIT FOR NONCOMMERCIAL EDUCATIONAL BROADCAST STATION

*(Carefully read instructions before filling out Form—***RETURN ONLY FORM TO FCC)**

For Commission Use Only

File No.

Section I **General Information**

1. Name of Applicant: Caprock Educational Broadcasting Foundation

Street Address: 2100 Hwy 360 Suite 1204

City: Grand Prairie | State: TX | ZIP Code: 75050 | Telephone No. *(Include Area Code)*

Send notices and communications to the following named person at the address below: (214)647-1010

Name: James Oyster

Street Address: 8315 Tobin Road

City: Annandale | State: VA | ZIP Code: 22003 | Telephone No. *(Include Area Code)*: (703)573-6765

2. This application is for: ☐ AM ☒ FM ☐ TV

(a) Channel No. or Frequency: 211/90.1

(b) Community of license: City: Lubbock | State: Tx

Check one of the following boxes:

- ☐ Application for new station
- ☐ Major Change in Existing station; call sign: _____
- ☐ Minor Change in Existing station; call sign: _____
- ☐ Modification of Construction Permit; File No. of CP: _____
- ☒ Amendment to Pending Application; Reference Number (ARN): 880328MM

NOTE: It is not necessary to use this form to amend a previously filed application. Should you do so, however, please submit only Section I and those other portions of the form that contain the amended information.

3. Is this application mutually exclusive with a renewal application?

☐ YES ☒ NO

If Yes, State: Call letters: ____-____ Community of license: City: _____ State: ____

Name of Applicant Caprock Educational Broadcasting Foundation

1. Purpose of authorization applied for:

☒ Construct a new station ☐ Install Auxiliary system

Change:
☒ Effective radiated power ☐ Frequency
☒ Antenna height above average terrain ☒ Transmitter location
☐ Studio location outside community of license
☐ Other (*Summarize briefly the nature of the changes proposed.*)

2. Community of license: State: Texas City or Town: Lubbock

3. Facilities requested:

Frequency	Channel No.	Class (Check one below)
90.1 MHz	211	☒ A ☐ B ☐ B1 ☐ C ☐ C1 ☐ C2 ☐ D

4. Geographic coordinates of antenna (to nearest second)

North Latitude 33° 30' 08" West Longitude 101° 52' 20"

5. Effective radiated power:

Polarization	Horizontal Plane	Maximum (Beam tilt only)
Horizontal	1.112 kW	kW
Vertical	1.112 kW	kW

6. Height in meters of antenna radiation center:

	Above Average terrain (HAAT)	Above Mean Sea Level	Above Ground
Horizontal	150 meters	1127.7 meters	147.7 meters
Vertical	150 meters	1127.7 meters	147.7 meters

7. Is a directional antenna being proposed? ☐ YES ☒ NO

If Yes, attach as Exhibit No. N/A an engineering statement with all data specified in Section 73.316(d) of the Commission's Rules.

8. Transmitter location: State Texas County Lubbock

City or Town: Lubbock

Street Address (*or other identification*): 9802 University St.

15. Tabulation of Terrain Data. *(Calculated in accordance with the procedure prescribed in Section 73.313 of the Commission's Rules utilizing 7.5 minute topographic maps, if available.)*

Radial bearing *(degrees true)*	Height of antenna, radiation center above average elevation of radial (3-16 kilometers) Meters	Predicted Distance To the 1 mV/m contour Kilometers
0°	Please see Exhibit E-5	
45°		
90°		
135°		
180°		
225°		
270°		
315°		

Allocation Studies

(See Subpart C of Part 73 of the Commission's Rules and Regulations)

16. Is the proposed antenna location within 320 kilometers (199 miles) of the common border between the United States and Mexico?

☐ Yes ☒ No

If Yes, attach as Exhibit No. N/A a showing of compliance with all provisions of the Agreement between the United States of America and the United Mexican States concerning Frequency Modulation Broadcasting in the 88 to 108 MHz band.

17. With regard to stations within 320 kilometers (199 miles) of the common border between the United States and Mexico, attach as Exhibit No. N/A information required in 1/.

18. If the proposed operation is for a channel in the range from channel 201 through 220 (88.1 through 91.9 MHz), then with regard to stations more than 320 kilometers (199 miles) from the common border between the United States and Mexico or if this proposed operation is for a class D station in the range from Channel 221 through 300 (92.1 through 107.9 MHz), attach as Exhibit No. E-6 a complete allocation study to establish the lack of prohibited overlap of contours involving these stations. The allocation study should include the following:

(a) The normally protected interference-free and the interfering contours for the proposed operation along all azimuths.
(b) Complete normally protected interference-free contours of all other proposals and existing stations to which objectionable interference would be caused.
(c) Interfering contours over pertinent arcs of all other proposals and existing stations from which objectionable interference would be received.
(d) Normally protected and interfering contours over pertinent arcs, of all other proposals and existing stations, which require study to show the absence of objectionable interference.
(e) Plot of the transmitter location of each station or proposal requiring investigation, with identifying call letters, file numbers and operating or proposed facilities.
(f) When necessary to show more detail, an additional allocation study will be attached utilizing a map with a larger scale to clearly show interference or absence thereof.
(g) A scale of miles and properly labeled longitude and latitude lines, shown across the entire (Exhibit(s). Sufficient lines should be shown so that the location of the sites may be verified.
(h) The name of the map(s) used in the exhibit(s).

1/ A showing that the proposed operation meets the minimum distance separation requirements. If any separations are proposed that are less than the applicable minimum separation requirements plus 15 kilometers, include these stations. Also include existing stations, proposed stations, and cities which appear in the Table of Assignments; the location and geographic coordinates of each antenna, proposed antenna or reference point, as appropriate; and distance to each from proposed antenna location.

19. Is the proposed antenna location within 320 kilometers of the common border between the United States and Canada?

☐ Yes ☒ No

If Yes, attach as Exhibit No. N/A a showing of compliance with all provisions of the Working Agreement for Allocation of FM Broadcasting Stations on Channels 201-300 under The Canada-United States FM Agreement of 1947.

20. With regard to station separated by 53 or 54 channels (10.6 or 10.8 MHz) attach as Exhibit No. E-7 information required in 1/*(separation requirements involving intermediate frequency [i.f.] interference).*

Section V-G **Antenna and Site Information**

Name of Applicant	Call Sign	Station Location
Caprock Educational Broadcasting Foundation	KAMY	Lubbock Texas

Purpose of Application (Put "X" in appropriate box)	Facilities Requested

6. Attach as Exhibit No. E-8 a vertical plan sketch for the proposed total structure (including supporting building, if any) giving heights above ground in feet and meters for all significant features. Clearly indicate existing portions, noting lighting, and distinguish between the skeletal or other main supporting structure and the antenna elements.

I certify that I represent the applicant in the capacity indicated below and that I have examined the foregoing statement of technical information and that it is true to the best of my knowledge and belief.

T. Kent Atkins
Name

T. Kent Atkins
Signature (*Check appropriate box below*)

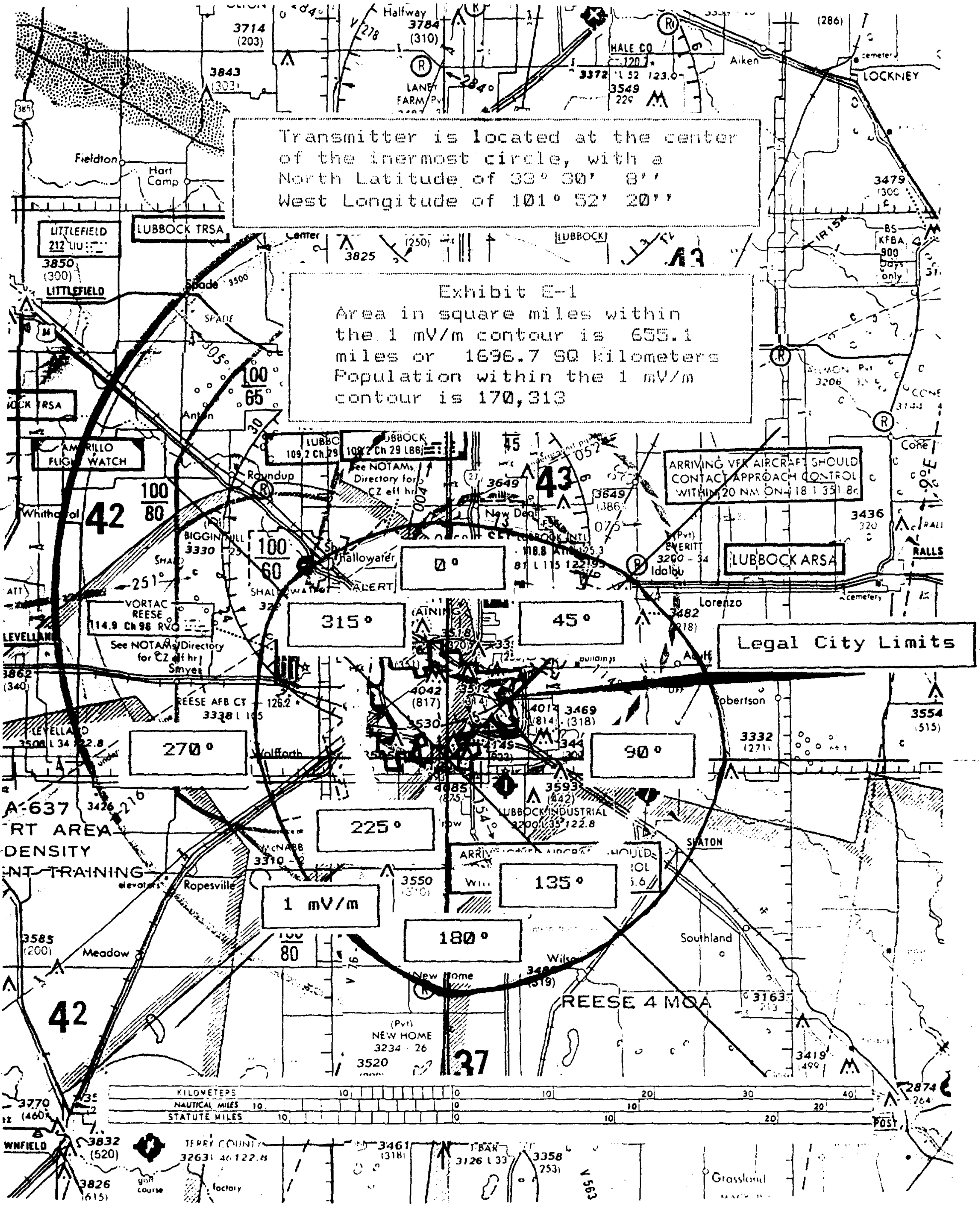
2100 Hwy 360, Suite 1204
Address (*include ZIP Code*)

Grand Prairie, TX 75050

(214) 647-1010
Telephone No. (*Include Area Code*)

☒ Technical Director ☐ Registered Professional Engineer ☐ Other (*specify*)

☐ Technical Consultant ☐ Chief Operator



Transmitter is located at the center of the inermost circle, with a North Latitude of 33° 30' 8'' West Longitude of 101° 52' 20''
Exhibit E-1
Area in square miles within the 1 mV/m contour is 655.1 miles or 1696.7 SQ Kilometers
Population within the 1 mV/m contour is 170,313
Legal City Limits
0°
45°
90°
135°
180°
225°
270°
315°
1 mV/m
LUBBOCK TRSA
LUBBOCK ARSA
REESE 4 MOA
KILOMETERS
NAUTICAL MILES
STATUTE MILES

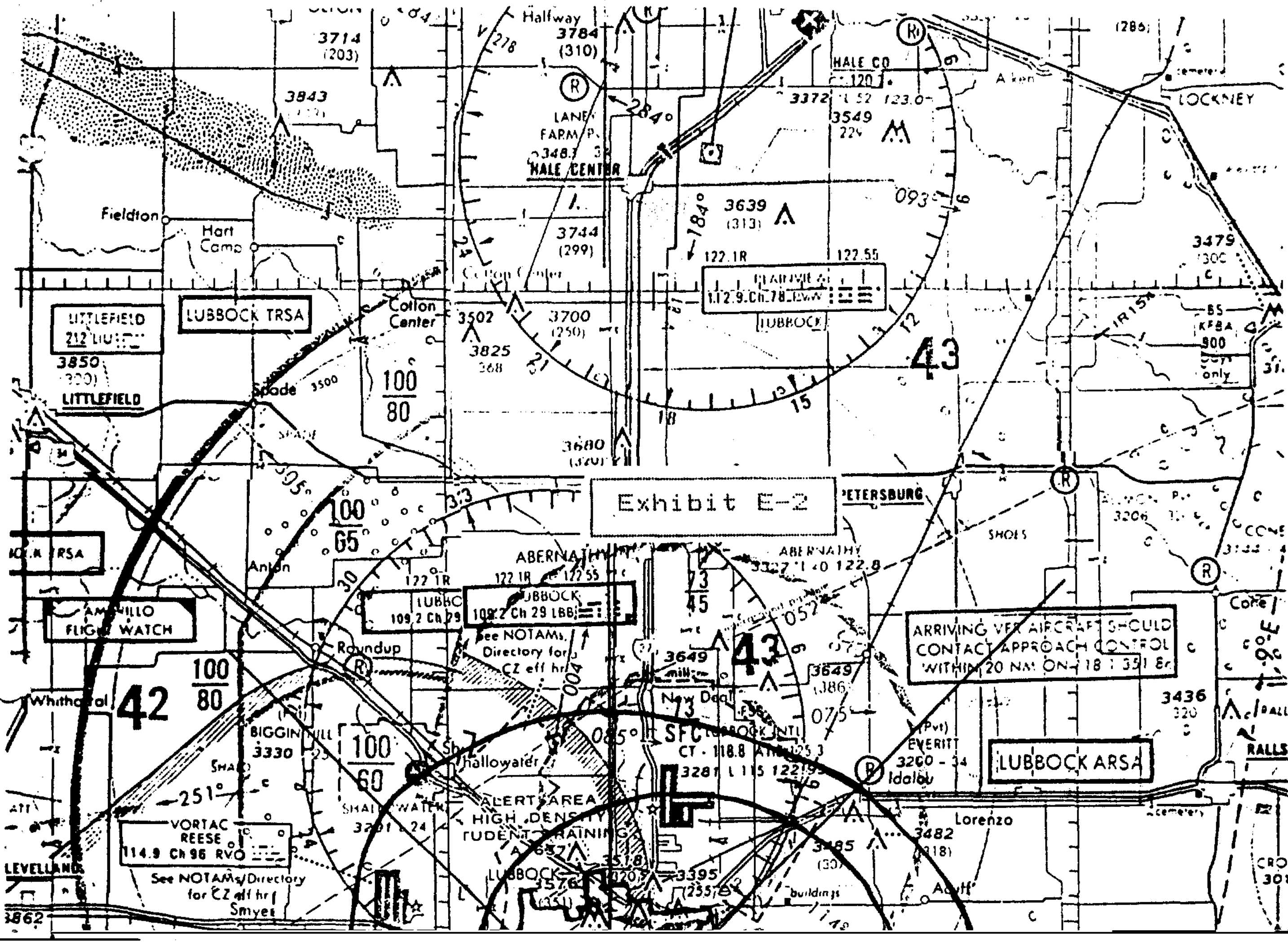


Exhibit E-2
Halfway
HALE CO
LOCKNEY
Fieldton
Hart Camp
LANEY FARM
HALE CENTER
Cotton Center
LITTLEFIELD
LUBBOCK TRSA
PLAINVIEW
LUBBOCK
43
Spade
LITTLEFIELD
PETERSBURG
ABERNATHY
AMARILLO FLIGHT WATCH
Anton
Roundup
See NOTAMs/Directory for CZ eff hrs
ARRIVING VFR AIRCRAFT SHOULD CONTACT APPROACH CONTROL WITHIN 20 NM ON 118.1 358.8
42
Whitharral
New Deal
BIGGIN HILL
Shallowater
LUBBOCK INTL
EVERITT
Idalou
LUBBOCK ARSA
Lorenzo
RALLS
ALERT AREA
HIGH DENSITY
STUDENT TRAINING
VORTAC
REESE
114.9 Ch 96 RVO
LEVELLAND
See NOTAMs/Directory for CZ eff hrs
Smyer
LUBBOCK

Exhibit E-4

This Applicant has determined that there will be no blanketing at the proposed antenna site. The immediate area is a commercially zoned area, and as such is sparsely populated. The transmitter site has been used by a full power UHF television station for the past five years without any blanketing problems.

Should any blanketing interference occur the Applicant will purchase any filters or take other such steps necessary to remedy the problem.
The Applicant assumes full responsibility for any such problems should they arise.

July 23, 1988

Exhibit E-5

Section V-B, 15 Of FCC Form 340

Caprock Educational Broadcasting

Lubbock Texas

Channel 211 Class A

Bearing	Average Terrain Radial (ft/mt)	Radiation Center A.A.T. (ft/mt)	3.16 mV/m (70 dBu) (mi/km)	1 mV/m (60 dBu) (mi/km)
0	3200.0/ 975.4	499.6/ 152.3	8.2/ 13.1	14.6/ 23.4
45	3152.2/ 960.8	547.4/ 166.9	8.6/ 13.8	15.2/ 24.3
90	3141.5/ 957.5	558.1/ 170.1	8.7/ 13.9	15.4/ 24.6
135	3165.0/ 964.7	534.6/ 163.0	8.5/ 13.6	15.0/ 24.0
180	3200.7/ 975.6	498.9/ 152.1	8.2/ 13.1	14.5/ 23.2
225	3271.2/ 997.1	428.4/ 130.6	7.6/ 12.2	13.5/ 21.6
270	3286.7/1001.8	412.9/ 125.9	7.4/ 11.8	13.3/ 21.3
315	3243.9/ 988.7	455.8/ 138.9	7.8/ 12.5	13.9/ 22.2

The Center Of Radiation Above Mean Sea Level is 3699.6 Feet or 1127.7 Meters

The Average Terrain Elevation is 3207.6 Feet or 977.7 Meters

The Radiation Center Above Average Terrain (HAAT) is 492.0 Feet or 150.0 Meters

The Area Within the 1 mV/m Contour is 655.1 Miles or 1696.8 Kilometers

July 23, 1988

The following exhibit is labeled E-5b and is now included for completeness and to show the predicted contours of a full Class A operating at the maximum 3 KW power and at 100 meters hieght, at the same site.

It is shown by comparison and should be noted, that the predicted

Exhibit E-6

T. Kent Atkins
Dallas, Texas

Exhibit E-7

July 23, 1988

FM Interference study

Title: LUBBOCK KJTV SITE CLASS A
Channel 211A (90.1 MHz) ERP: 3 kW; EAH: 100 m
Database: DW 07/20/88

Latitude: 33-30-08
Longitude: 101-52-20
Safety zone: 65 km

Call / City of License	Auth / St	Licensee name / FCC File no.	Chan / Freq	ERP-kW / EAH-m	Latitude / Longitude	Br-to / -from	Dist. (km)	Req. (km)
KENW-FM LIC		BD OF REGENTS EASTERN NM	*208C1	100	34-10-27	299.1	155.8	43.21
PORTALES	NM		89.5	56	103-21-03	118.3	112.6	CLEAR
Proposed F(50,50)	100 dBu = 2.201 km;		KENW-FM	F(50,50)	60 dBu = 41.01 km			
Proposed F(50,50)	60 dBu = 24.32 km;		KENW-FM	F(50,50)	100 dBu = 4.371 km			
ALLOC			*209A		32-19-12	205.8	145.5	32.00
ANDREWS	TX		89.7		102-32-48	25.4	113.5	CLEAR
Proposed F(50,50)	80 dBu = 7.676 km;		ALLOC	F(50,50)	60 dBu = 24.32 km			
Proposed F(50,50)	60 dBu = 24.32 km;		ALLOC	F(50,50)	80 dBu = 7.676 km			
ALLOC			*210A		32-44-06	185.4	85.47	60.70
LAMESA	TX		89.9		101-57-30	5.3	24.77	CLEAR
Proposed F(50,10)	54 dBu = 36.38 km;		ALLOC	F(50,50)	60 dBu = 24.32 km			
Proposed F(50,50)	60 dBu = 24.32 km;		ALLOC	F(50,10)	54 dBu = 36.38 km			
KAMY CP		CAPROCK ED BCG FOUND	*211A	.50	33-32-31	48.1	6.611	89.34
LUBBOCK	TX	BPED-840626IE	90.1	82	101-49-09	228.1	-82.7	SHORT
CP Granted 10/15/87; Was KCEI 04/08/88								
Proposed F(50,10)	40 dBu = 75.30 km;		KAMY	F(50,50)	60 dBu = 14.04 km			
Proposed F(50,50)	60 dBu = 24.32 km;		KAMY	F(50,10)	40 dBu = 48.04 km			
KAMY APP		CAPROCK ED BCG FOUND	*211A	1.50	33-36-32	48.1	17.79	99.05
LUBBOCK	TX	880328MM	90.1	134	101-43-45	228.2	-81.3	SHORT
Was KCEI 04/08/88								
Proposed F(50,10)	40 dBu = 75.30 km;		KAMY	F(50,50)	60 dBu = 23.75 km			
Proposed F(50,50)	60 dBu = 24.32 km;		KAMY	F(50,10)	40 dBu = 70.41 km			
ALLOC			*211A		32-42-00	233.1	147.4	99.61
HOBBS	NM		90.1		103-07-54	52.4	47.82	CLEAR
Proposed F(50,10)	40 dBu = 75.30 km;		ALLOC	F(50,50)	60 dBu = 24.32 km			
Proposed F(50,50)	60 dBu = 24.32 km;		ALLOC	F(50,10)	40 dBu = 75.30 km			
ALLOC			*211A		32-23-42	142.4	154.8	99.61
COLORADO CITY	TX		90.1		100-51-54	322.9	55.14	CLEAR
Proposed F(50,10)	40 dBu = 75.30 km;		ALLOC	F(50,50)	60 dBu = 24.32 km			
Proposed F(50,50)	60 dBu = 24.32 km;		ALLOC	F(50,10)	40 dBu = 75.30 km			
KPLN-FM LIC		PLAINS INDEPENDENT SCHOO	*213A		33-11-15	249.5	95.09	44.24

FM Interference study

Title: LUBBOCK KJTV SITE CLASS A
Channel 211A (90.1 MHz) ERP: 3 kW; EAH: 100 m

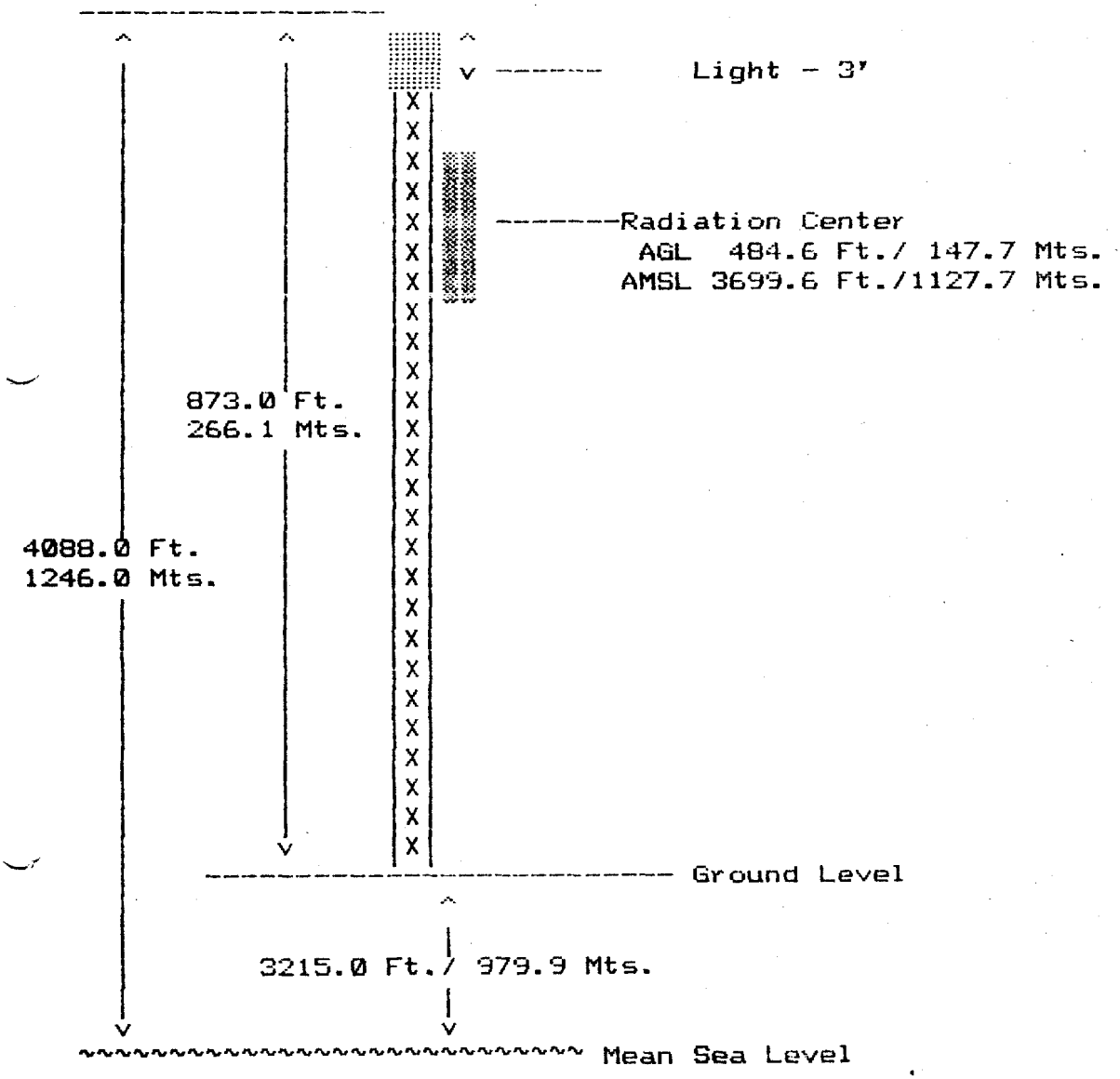
Latitude: 33-30-08
Longitude: 101-52-20

Call City of License	Auth	Licensee name St FCC File no.	Chan Freq	ERP-kW EAH-m	Latitude Longitude	Br-to -from	Dist. (km)	Req. (km)
KDTD	CP	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]

July 23, 1988

Exhibit E-8

Vertical Plan Sketch of Total Structure Channel 211 Class A



NOTE : NOT TO SCALE

Element Depictions are Purely Symbolic

Shively Laboratories FM Antenna Model 6810
8 Bays - Power Gain 4.4 (6.43 db)
Vertical Apperture 77 Feet

Lubbock Texas
Caprock Educational Broadcasting